DESTROYING BEES and WASPS

By Elbert R. Jaycox

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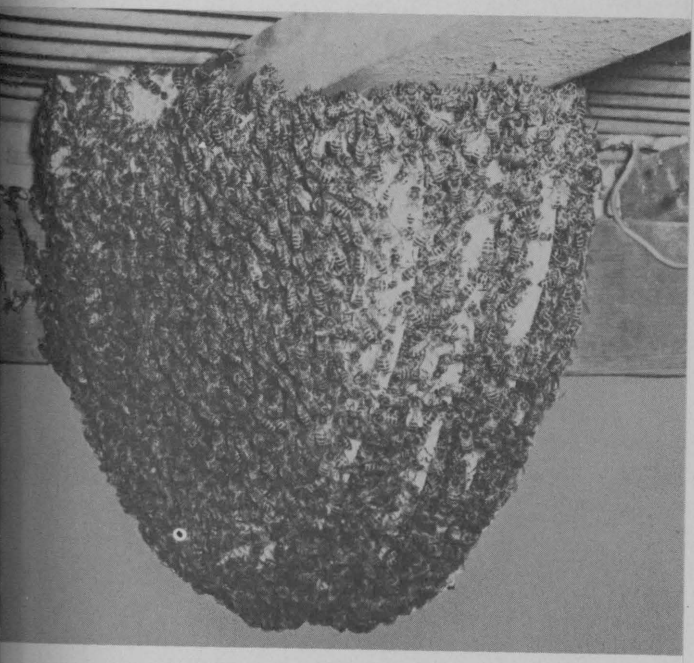

UNIVERSITY OF ILLINOIS AT URBANA-CHAMPAIGN
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BEES AND WASPS are two of the insects most beneficial to man. Bees produce honey and wax, and serve as important pollinators; wasps attack and destroy many kinds of harmful insects including flies and caterpillars. In spite of their value, several kinds of bees and wasps are unwelcome in and around buildings because of their ability to sting and their tendency to defend their nests. Wasps are rather similar to bees in appearance, and honey bees are often blamed for the misdeeds of some of the social wasps such as the hornets and yellow jackets. Wasps can sting repeatedly while the honey bee stings only once and leaves a stinger at the site of the sting.

Both wasps and bees can be readily controlled with insecticides. Honey bees present more serious removal problems because of the larger size of their colonies and their tendency to nest within the walls of buildings.

Honey bee swarms

In spring and early summer, honey bee colonies divide by swarming. Half or more of the worker bees leave their home to begin a new colony, usually with their old queen. They cluster temporarily on some object such as a tree branch for a period of a few hours to several days, and then enter a new home such as a hollow tree or the wall of a building.

Swarms are not usually a problem unless they land in an inconvenient spot or if they are molested. They are best left alone until they leave. Otherwise, contact the local police department or other agencies for the names of beekeepers willing to collect swarms. The low value of the bees themselves and other problems of collecting swarms have forced many beekeepers to charge for the service. An alternative is to have the bees killed by a pest-control operator who will also

charge for doing the job. If one person agrees to come for the bees, do not contact other people about doing the same job.

Honey bees in buildings

When a swarm enters a building, it begins to build combs of wax in which to rear young bees and store honey. Only at this time, when the bees first enter, can they be killed without having to open the wall and remove large quantities of dead bees, wax, and honey. If the colony has been in place as long as a month, it must be removed after it is killed, to prevent problems from the odors of decaying bees, other insect pests entering the wall, and honey released within the wall as combs melt or are destroyed by other insects or mice.

Insecticides are the safest and most satisfactory materials for killing bees in buildings. Do not use fumigants or other poisonous or flammable compounds. Carbaryl (Sevin), chlordane, lindane, and malathion are most suitable. *All of them are toxic to humans and must be used with care according to the directions on the container label.*

Before applying an insecticide, you must know the location of the colony in the wall, especially in relation to the flight entrance. In many cases, the colony's nest is far enough away from the entrance that insecticides applied at the entrance will not reach the bees. The bees' nest should be located by tapping on the wall at night and listening for the area of loudest buzzing sounds. The bees keep the nest center at about 95° F., a temperature high enough to warm the wall beside it so that you may be able to feel as well as hear the nest location.

Either dust or spray formulations can be used within walls or other cavities, but dusts generally disperse better within them. Apply the insecticide at night through the entrance hole if the

colony is fairly close to it in the wall. Otherwise, drill a hole in the wall above the colony and apply the dust or spray through it. Afterwards, seal the hole and all other holes through which bees might enter or leave the wall. An extremely large colony may require an additional treatment after about 10 days to kill emerging young bees.

After all sound and flight activity have ceased, or at least within 2 weeks, open the wall and remove all dead bees, combs, and honey. These must be burned or buried because they are attractive to other bees and are toxic to both bees and people. Do not expose the honey and wax where other bees can reach it or you may damage valuable honey bee colonies nearby. The location within the wall will be attractive to other swarms unless it is sealed tightly to keep them out. An additional application of lindane or chlordane spray will also help to prevent the entry of another swarm.

There is an element of risk, or at least uncertainty, in dealing with bees, and you may prefer to have the job done either by a competent pest-control operator or an experienced beekeeper. No matter who does the job, it may pose problems and considerable expense, at least in man-hours of labor. Systems of trapping the bees or removing them alive from the wall usually are not satisfactory and are not recommended.

When bees or wasps enter a room or an automobile, they rarely sting and usually fly to a window. In a room they can be killed with an aerosol spray containing one of the insecticides mentioned above. If a bee enters your car, remain calm, stop the car, and open the windows to let it out. A bee or wasp on the windshield or rear window may have to be "herded" out with a map or newspaper, or crushed quickly with a handkerchief or wad of paper.

Other bees

Bumble bees are occasionally a problem when they nest in and around buildings or near walks. They like to nest in old mattresses, car cushions, and other places such as mouse nests. The colonies vary widely in disposition and size, with rarely more than a few hundred bees. They can be killed by insecticide dust or spray applied to the nest at night. Use the same compounds suggested for use on honey bees.

Carpenter bees are large metallic-colored bees similar in size and general appearance to bumble bees. They are solitary bees that rarely sting, but often frighten people when they bore holes and nest in redwood or other soft woods around a home. They can be killed by injecting insecticide dust, spray, or aerosol into their individual nest holes. Use the materials suggested for honey bees.

Wasps

Hornets, yellow jackets, and paper wasps are social wasps that build gray-colored paper nests in the open or under ground. They often sting people who approach nests located under eaves, in shrubbery, or in underground cavities near buildings or walks. Solitary wasps, even the very large cicada-killer wasp that nests in the ground, rarely sting unless they are handled or get caught in your clothing. They have no instinct to protect their nests as the social species do.

Nests above ground should be sprayed at night with chlordane or lindane. Mix the spray from emulsifiable concentrate or wettable powder. Aerosol spray cans are not suitable for this purpose. Underground nests can be treated by spraying or dusting the same materials into the entrance at night. Cover the entrance with a shovelful of moist soil after treatment.

Insecticide sprays and dusts

Spray formulation	*Amount / gallon water*
Carbaryl (Sevin)	
50-percent wettable powder	2 tablespoons
Chlordane	
45-percent emulsifiable concentrate	2 tablespoons
72-percent emulsifiable concentrate	1 tablespoon
40-percent wettable powder	2 tablespoons
Lindane	
25-percent wettable powder	2 tablespoons
Malathion	
50- to 57-percent emulsifiable concentrate	2 teaspoons
25-percent wettable powder	1 tablespoon

Dust formulations

Carbaryl (Sevin) — 5-percent
Chlordane — 5-percent
Lindane — 1-percent
Malathion — 4- or 5-percent

Precautions

The insecticides listed here may be injurious to man and other animals if used improperly. Use them only when needed, and handle and store them with care. Bees and wasps are highly beneficial insects. Kill only those that may be a hazard to people around your home, farm, or place of business.

This circular was prepared by Elbert R. Jaycox, Professor of Apiculture.

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